SARS-CoV-2 Neutralization Antibody Rapid Test Kit

Catalog No.: abx092242

Size: 400 tests / 2000 tests / 10000 tests

Storage: Store all reagents at 2–30°C. Keep dry.

Application: For qualitative detection of SARS-CoV-2 Neutralization Antibodies in Human serum, plasma and whole blood.

Introduction and assay principle

Abbexa's SARS-CoV-2 Neutralization Antibody Rapid Test Kit is based on the gold immuno-chromatography assay (GICA) principle. The sample pad inside the cassette contains gold nanoparticles labelled with SARS-CoV-2 Spike protein. When the sample is coated on the nitrocellulose membrane, the antibodies bind with the spike protein subunit RBD-NTD-CTD, creating the test line. The control region on the upper end of the cassette confirms if the test has been successful with the presence of the control line. If the concentration of SARS-CoV-2 Neutralization Antibodies in the sample is more than the detection limit, there is a color change in the detection line and the result is positive. When the concentration of SARS-CoV-2 Neutralization Antibodies in the sample solution is less than the detection limit, there is no color change in the detection line and the result is negative.

Kit Components

- Test Cassettes with pipette
- Buffer
- Desiccant

Material Required But Not Provided

- Timer

Sample preparation

Fresh samples are recommended. Avoid repeated freeze/thaw cycles, bacterial pollution, visible particles; and avoid cloudy, hemolytic, or viscous samples.

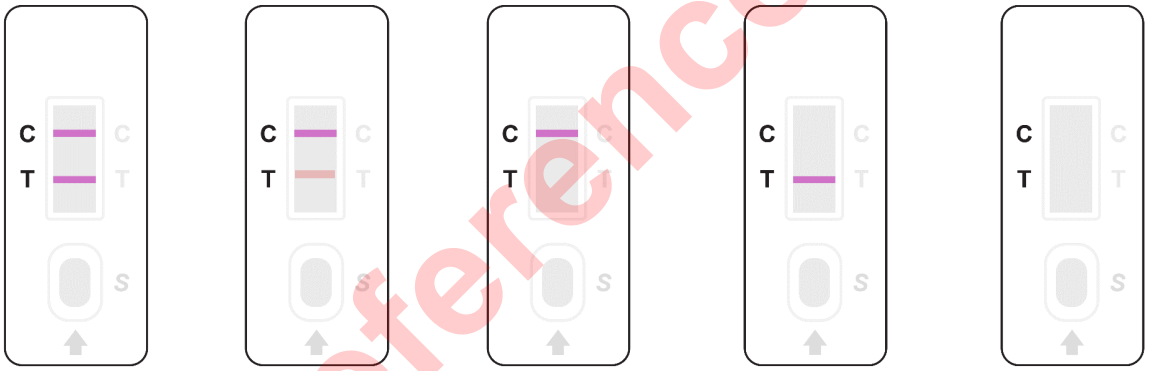
- **Serum and plasma:** Collect samples using conventional methods and store between 2–8 °C for up to 3 days or -20 °C for long-term storage. Separate serum/plasma from whole blood as soon as possible to avoid hemolysis. **Collect plasma using EDTA or heparin sodium as an anticoagulant**.
- **Whole blood:** Collect samples in an anticoagulant tube and test immediately or store at 2–8 °C for up to 2 days. Whole blood samples should not be frozen.

Assay procedure

1. Take a Test Cassette and lay it flat on a clean table.
2. Using the provided Pipette or a micropipette, slowly and vertically add 1 drop (approximately 30 µl) of serum / plasma sample or 2 drops (approximately 50 µl) of whole blood sample to the sample well on the test cassette. Avoid foaming.
3. Add 4 drops of buffer. If the sample is very thick, 1 more drop of buffer can be added.
4. Start the timer and leave at room temperature for 15 minutes, then analyze the result. Do not read the result after 30 minutes.

Results analysis

- **Positive result:** A colored line is observed in both the control (C) section and the test (T) section. A faint line in the test (T) section should still be considered a positive result.
- **Negative result**: A colored line is observed in the control (C) section but not the test (T) section.
- **Invalid result**: No colored line is observed in the control (C) section.



Positive **Positive** **Negative** **Invalid** **Invalid**

Notes

1. It is recommended to use serum and plasma samples with this kit.
2. The Test Cassettes should be brought to room temperature before use.
3. After opening the aluminum foil, use the test cassette within 1 hour.
4. Samples should be clear with no hemolysis, visible particles, turbidity, or bacterial pollution.
5. Do not mix or re-use the disposable pipettes to avoid cross-contamination. It is recommended to use a micropipette with this kit.
6. Avoid touching the cassette membrane through the sample well or test result window.
7. This kit is for qualitative detection of SARS-CoV-2 Neutralizing antibodies in Human serum, plasma and whole blood samples. For other sample types, a preliminary experiment is recommended to determine compatibility with this kit.
8. This kit is for research use only and the results are for reference only. A rough estimate of the antibody concentration can be determined by the intensity of the color of the detection line. The presence of binding

antibodies does not indicate the presence of SARS-CoV-2 neutralizing antibodies specifically, therefore it is recommended to use this kit in conjunction with another detection method.

9. All waste should be disposed of appropriately. Please note that you may need to follow special waste disposal procedures for infectious samples. Please check local disposal regulations.

Technical Support

For troubleshooting and technical assistance, please contact us at support@abbexa.com.